Draft Economic Comparison Of A Full Range Of Potential Strategies To Increase Water Supply Reliability For Urban And Agricultural Water Users

Description of Enclosures

Enclosure 1

Enclosure 1 (SUPPLY DATA AT SOURCE) is a table separately presenting preliminary information on costs and quantities of water available thorough a variety of water management measures.

The effects of water management measures vary, depending in large part on where in the state the measure is implemented. Therefore, the cost and quantity information is organized by location (labeled LOCATION in the tables) within each type of measure.

The types of tools (labeled TYPE in the tables) fall into the following categories:

- urban water use efficiency (Urban WUE), consisting of water conservation.
- agricultural water use efficiency (Ag WUE).
- Urban Recycling.
- Temporary land fallowing (Land Fallow).
- Active Conjunctive Use.
- Surface Storage.
- Other.

The locations within the state (LOCATION) are self-explanatory.

Within each Type and Location combination, cost and quantity information is presented in order of ascending average cost, expressed in dollars per acre-foot of water (Average P). Quantities available from each measure are presented in thousands of acre-feet of water per year.

The cost information presented is for cost at source and does not include the costs of transferring water to the ultimate user.

Other abbreviations in the table:

- BMPs best management practices, which are a set of practices that water agencies can adopt to conserve water.
- CII commercial, industrial, and institutional, which is a grouping of water uses for statistical and management purposes.
- ET evapo-transpiration, which is the loss of water through evaporation or transpiration; here the number measures the rate of ET, a smaller number indicating less loss.

Enclosure 2.

Enclosure 2 is a set of charts, one for each of five regions of the state, showing water supply and demand curves.

Two water supply curves appear on each chart. Each curve is a series of points, derived by displaying the cost and quantity of water available from each discrete project to implement a specific water management tool. The curve results when the data from these discrete projects are added sequentially, beginning with the least costly projects. The curves represent average cost at retail (that is, delivered to a consumptive use) and marginal cost at retail.

Two water demand curves appear on each chart. "Demand before BMPs" is derived from the projected demand in 2020, assuming current prices, and from a consensus of expert opinion on the elasticity (price-responsiveness) of demand for water in that region. "Demand after BMPs" is derived in a similar manner, but includes an assumption that best management practices have been implemented to manage water use in the region.

Enclosure 3.

Enclosure 3 is a set of tables, one for each of five regions of the state, identifying which water management tools are included in the water supply curves displayed in the enclosure 2 graphs. The tools are ranked by average cost, with the least expensive tools displayed as the first entry in each table.